



Watershed Stewards  
Program

# Weekly Safety Meeting Discussion Topics

## Table of Contents

Purpose of this Document: .....	3
Elk Safety: .....	3
Poison Oak - Leaves of Three, Let Them Be! .....	3
Driving in the Rain .....	4
Slips and Falls .....	5
Car Maintenance .....	6
Common Sense Safety.....	7
Back Pack Safety .....	7
Driving: Long Distance Driving Safety Tips.....	7
Safe Drinking Water .....	9
Hypothermia/Frostbite.....	10
ATV Safety.....	10
Lightning .....	10
Towing a Trailer .....	10
Proper Lifting .....	10
Preventing Back Injuries in the Work Place: .....	10
Electrical Safety Tips: .....	11
Workplace Safety Electrical Tips.....	12
What's in that Fridge? .....	13
Driving in the Rain .....	14
Stopping the Spread of Germs at Work.....	15
Staying Hydrated: .....	16
Office Ergonomics .....	17
Insect Repellant: Safe Use .....	18
Personal Hygiene .....	19
Blue-Green Algae Blooms.....	20
Dehydration .....	20
Heat Related Illness .....	20
Barbeque Safety.....	21
Asbestos .....	23
Smoke Inhalation .....	23
Spiders.....	25
Treating Cuts or Lacerations at Home .....	26
Stop Ticks.....	27

Stay Safe While Boating .....	28
Campfire Safety .....	29
Hand and Power Tool Safety .....	31
Road Rage .....	32
Fire Extinguisher Safety .....	32
Earthquake Safety .....	32
Carpal Tunnel .....	33
Overcoming Procrastination .....	35
Hearing Loss- Hear Today Gone Tomorrow .....	37
How can you tell if it is too loud?.....	37

## Purpose of this Document:

The following information is meant to be used as a resource for WSP Mentors when developing weekly safety meeting topics to discuss with their WSP Members. Mentors can use this information as a starting point, and should supplement all weekly safety meetings with Site specific topics.

## Elk Safety:

During rut season from September to October, testosterone levels in bulls rise dramatically and they fight to gain breeding access to females. Elk are very large unpredictable animals that can easily injure or kill someone without warning. It's wise to respect these beautiful and powerful animals.

**\*For more information go to:**

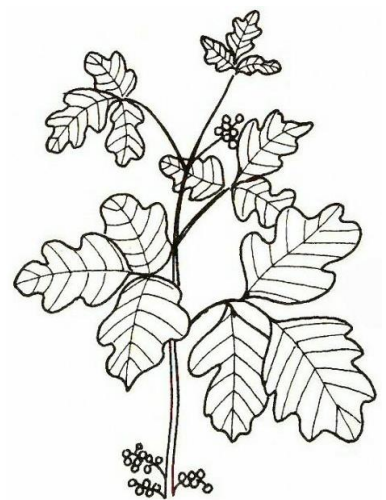
- [http://www.pc.gc.ca/docs/pc/guide/nature/nature04\\_e.asp](http://www.pc.gc.ca/docs/pc/guide/nature/nature04_e.asp)
- <http://www.nps.gov/grsm/naturescience/elk.htm>
- <http://www.youtube.com/watch?v=gXSUB2kksFc>

## Poison Oak - Leaves of Three, Let Them Be!

Thousands of California workers seek medical treatment for poison oak dermatitis every year. While some individuals are less susceptible than others, no one is completely immune. There are some simple things you can do to prevent or minimize the unpleasant often-disabling effects of poison oak exposure. Learn to recognize, avoid, and prevent exposure, and get rid of it when possible.

### Recognize

The poison oak leaf looks like a miniature oak leaf, a triple leaf pattern leading off one stem with prominent veins and a shiny surface. In some regions the leaves remain green during the entire time they



are on the stem. In other areas the leaves change to various colors with the changing seasons. After the leaves fall off, the bare wood is also dangerous and so are the roots. It can grow in the form of vines, trailing shrubs, or upright woody shrubs. It may flourish in the deep woods where soil moisture is plentiful or it may be found in very dry soil on the most exposed hillsides.

### **Avoid**

Stay away from any vegetation that you suspect may be poison oak. Avoid contact with anything that touched it, whether animal, clothing or tools.

### **Prevent**

Sometimes you have to enter or work in areas where there is poison oak. When this is necessary, certain precautions can be taken:

- Wear protective clothing such as long-sleeved shirts, long pants tied around the ankles, leather gloves with gauntlets and neckerchiefs.
- Several protective creams are available which form barriers to protect against the toxic oil found in all parts of the plant. There are also injections or tablets that provide protection for some people.
- When removing clothing, take shoes off first and leave them outside for decontamination by washing.
- Remove all clothing and wash it separately.

Any object you touch after having been exposed to poison oak can act as a carrier to contaminate others.

- If you come in contact with poison oak, wash immediately or take a shower, not a bath, using strong soap or detergent.
- When dressing, put shoes on last so that any poisonous substance remaining on shoes does not contaminate the inside of trousers.

**\*For severe inflammation and itching, consult a physician.**

**\*\*No part of the plant should ever be eaten. It is a violent irritant and poisonous. It should never be destroyed by burning. Inhalation of the smoke can be catastrophic.**

## **Driving in the Rain**

---

**Rainy driving tips** - Smart Motorist offers the following suggestions for safer driving in wet weather. In stormy conditions, it is more difficult to see other vehicles, road signs and the road itself. It is critical to make sure you can see and be seen.

- First and foremost: slow down! It takes longer to stop or adjust in wet weather.
- Stay toward the middle lanes - water tends to pool in the outside lanes.
- Maintain proper following distance (3 Second Rule). This needs to be increased in wet weather.
- Drive in the tracks of a car ahead of you.
- Don't follow large trucks or busses too closely. The spray created by their large tires reduces your vision. Take care when passing them as well; if you must pass, do so quickly and safely.

- Be more alert when driving in wet or slippery conditions. Watch out for brake lights in front of you.
- Avoid using your brakes; if possible, take your foot off the accelerator to slow down.
- Turn your headlights on even in a light rain, or in gloomy, foggy or overcast conditions. Not only do they help you see the road, but they'll help other drivers see you. If your car has daytime running lights you still should put them on, so vehicles behind you can see you better.
- Before it starts to rain, replace old or brittle wipers.
- Avoid off-road driving: it's hard to judge the actual depth of puddles and you can easily become stuck, even in an SUV.
- Never drive beyond the limits of visibility. At night rainy roads become especially treacherous. The glare of oncoming lights, amplified by the rain on your windscreen, can cause temporary loss of visibility while substantially increasing driver fatigue. In rainy conditions pedestrians, livestock, and wildlife are extremely hard to spot and even harder to avoid.
- Never drive through moving water if you can't see the ground through it; your car could be swept off the road.
- When driving through a puddle of uncertain depth, go slow. If it's deeper than the bottom of your doors, turn around and find another route. Deep water can cause serious damage to a modern car's electrical system.
- Avoid splashing pedestrians.
- If possible, stay off the road during heavy thunderstorms. Large flashes of lightning can temporarily blind and disorient drivers, and the accompanying high winds and heavy rain can create deadly driving conditions.
- Slow down! This should be obvious but it also very important. People are so used to driving certain speeds on certain roads that sometimes they forget the need to slow down when inclement weather presents itself

## Slips and Falls

---

**Walking:** (also called ambulation) For humans, walking is the main form of transportation without a vehicle or riding animal. Walking is generally distinguished from running in that only one foot at a time leaves contact with the ground: for humans and other bipeds running begins when both feet are off the ground with each step.

An average walking speed is about 4 to 5 km/h (2 to 3 mph), although this depends heavily on factors such as height, weight, age and terrain. A pedestrian is a walking person, in particular on a road (if available on the sidewalk/path/pavement) When carried out in shallow waters, it is usually described as wading and when performed over a steeply rising object or an obstacle it becomes scrambling or climbing. The word walk is descended from the Old English wealcan "to roll".

**Running:** Running is defined as the fastest means for an animal to move on foot. It is defined in sporting terms as a gait in which at some point all feet are off the ground at the same time. Running is executed as a sequence of strides, which alternate between the two legs. Each leg's stride can be roughly divided into three phases: support, drive, and recovery. Support and drive occur when the foot is in contact with the ground. Recovery occurs when the foot is off the ground. Since only one foot is on the ground at a time in running, one leg is always in recovery, while the other goes through support and drive. Then, briefly, as the runner leaps through the air, both legs are in recovery

**The Human Element:** Why, you may ask, am I regurgitating to you the complex definitions of common physical actions that are performed often and sometimes done seemingly without cognitive involvement? Unfortunately, most people, at certain moments of their lives do not always efficiently move their bodies like a graceful ballerina by gliding, smoothly, easily or quietly. As you may have noticed from the definitions above, walking and running is quite an involved and substantial motion that involves kinetic velocity propelling physical mass through the universe. In addition, there are a million of things that can interfere with this motion at any given time. Segments of the population tend to refer to these interferences as accidents, whoopsies, uh-o's; or, a probabilistic outcome which could have been avoided and prevented had circumstances leading up to the accident been recognized, and acted upon, prior to its occurrence.

In fact, if you're anything like me, pull up a pant leg and you'll get to admire several large, purple and yellow stripy bruises with no knowledge of their origination. Yes, this safety tip is from a compassionate Klutz that also happens to be recovering from a sprained right ankle due to falling off a porch while performing an impromptu morning stretch last week. In other words, take this (& any) intelligence for what it's worth.

Accidents happen and people are constantly walking, running, tripping and dancing around danger here on this earth. As humans, that are alive, you are the moving target for multitudes of cosmic and pre-dispositional tendencies; such as: *biffing, stumbling, tumbling, plummeting, nosedive, miscue, sliding, blundering, bungling, erring, falling, fault, flubbing goofing, miscue, mishap, misstep, mistake, muff, neglecting, oversight, quay, skidding, slithering, stumbling, bashing, knocking, popping, slamming, slogging, smashing, smiting, whamming and over-all whopping of the body.*

However, one way you can attempt to protect yourself is by making intentions coextensive with action by:

**Walking slowly!**

**Keep your eyes on where you are going!**

**Take small steps to keep your center of balance under you!**

**Wear the proper foot gear!**

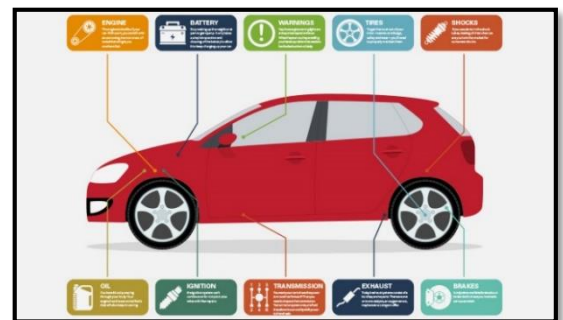
**BE AWARE!**

## Car Maintenance

One of the ways to keep safe is to regularly maintain vehicles.

**\*For more information go to:**

- <http://cars.cartalk.com/content/advice/index.html>
- <http://ezinearticles.com/?Womens-Safety-Tips---Vehicle-Maintenance-Safety-Tips-For-Women&id=1236159>
- <http://www.edmunds.com/carownership.html>



## Common Sense Safety

---

There are a number of safety problems common to most workplaces and job sites that can be solved with a little common sense. Planning and thinking ahead can help eliminate most of these hazards. Take a close look at your workplace with these suggestions in mind.

**Eliminate junk piles.** Organize a clean-up program to remove trash, broken parts, and scrap from work areas, walkways, storerooms, and neglected corners. Look for materials that have been stacked improperly. An unstable stack is a real danger to anyone who may be near if the material suddenly falls. Check such things as wood pallets, dock freight, storeroom boxes, construction materials and even office files to see that materials are stacked properly.



**Protect yourself from electric shock** by making sure all electronics are properly used and cared for. Never cut off the ground plug on a three-prong plug and do not overload any single electrical socket. Check electrical cords and wires for any damage and quickly replaced if needed.



**Fire extinguishers are a must** and should be mounted properly, readily accessible, and in working order. Check fire regulations to make sure they are properly placed and the right type for your work area. When was the last time your fire extinguishers were tested? Extinguisher inspections should be made regularly then tagged to show when and who performed the tests.



**Easy to read emergency exit signs** should be appropriately placed throughout your work environment. Signs with arrows should also be used to guide people to the exit if the layout of the workplace for those unfamiliar with your facility. Don't block exits or signs with vehicles or other materials. Another good idea is to mark doors that are not exits with "This is Not an Exit," "Restroom," "Storeroom" or "Closet."

## Back Pack Safety

---

Having a properly fitting backpack is an important step towards promoting skeletal health.

**\*For more information go to:**

- <https://www.rei.com/learn/expert-advice/backpacks-adjusting-fit.html>



## Driving: Long Distance Driving Safety Tips

---

The goal of long distance driving is to get to your destination safely. We all know someone who says, "The time to get there is usually six hours; I did it in four and a half!" Speed should not be your primary focus. If you focus on getting there in the fastest amount of time, mistakes and errors in judgment can be made. Here are five tips to reach your destination in one piece.

### Carry your Voyager card!

The State of California Official State Fleet Card (your Voyager card) not only fills up your gas tank. The Voyager Fleet Assistance phone number located on the back of the card can be used for emergencies.

Give them a call if you get a flat, lock keys inside the vehicle or get into an accident.

**If you use cruise control, use it safely.**

Although there are many advantages and conveniences with using “cruise control” there are times and places it can become hazardous. Cruise control **should not** be used in the following situations:

- On icy or snowy roadways
- When temperatures are near freezing and when you approach a bridge or overpass
- On rainy days when water puddles
- During heavy downpours of rain or hail
- When becoming tired or fatigued

WHY? - Anytime you encounter a road surface (particularly hilly terrains) that may be slippery there is the chance the transmission will shift into a lower gear. Should this happen the drive-train tires will spin due to the traction loss via acceleration. Should this occur there is a chance that you may lose control of the vehicle. If you are fatigued or drowsy and are operating with cruise control on you will not experience any gradual speed slowing effects should you drift off the roadway. Any decrease in speed is beneficial in regaining control of the vehicle and avoiding a crash.

**You are what you eat!**

Don't Eat Heavy Food during the trip. You are going to be sitting and stationary for several hours at a time. Fast food in your stomach will give you a bloated and heavy feeling. Heavy and greasy food like double cheeseburgers, French fries, pizza, fried chicken and biscuits will contribute to the desire to take a nap. Better to eat light food like salads, soup, fruit cups and juice during the trip to keep your head clear. Coffee or hot chocolate is always a safe bet for long distance driving. Remember to drink plenty of water too! Bring an ice chest filled with drinks and light snacks to keep you going through out your trip.

**Stop Frequently**

Contrary to popular belief, long distance driving demands frequent rest stops. Fatigue can overtake you quickly, especially if you only watch the road in front of you instead of taking in the scenery while you drive. Be aware of overall discomfort, muscle aches in the neck, arms and shoulders. This is your body telling you it needs a break. When your tank is half empty, take bathroom and gasoline breaks at the same time, or stop at least every 2 hours.





## Drinking Water Treatment Methods for Backcountry and Travel Use

### Fact Sheet for Healthy Drinking Water

This document should only serve as a guide for individuals intending to use untreated or poorly treated water as a drinking water source. This document may also aid travelers and backcountry water users in researching drinking water treatment methods. Except for boiling, few of the water treatment methods are 100% effective in removing all pathogens.

Table Key for Pathogen Removal			
+	not effective		
++	low effectiveness		
+++	moderate effectiveness		
++++	high effectiveness		
+++++	very high effectiveness		

Contaminant	Potential Health Effects from Ingestion of Water	Sources of Contaminant in Drinking Water	Methods that may remove some/all of the contaminant				
			Boiling (Rolling boil for 1 minute minimum) *	Filtration **	Disinfection*** Iodine or Chlorine	Chlorine Dioxide	Combination Filtration and Disinfection****
<b>Protozoa-</b> <i>Cryptosporidium</i>	Gastrointestinal illness (e.g., diarrhea, vomiting, cramps)	Human and animal fecal waste	+++++	+++ Absolute ≤ 1.0 micron filter (NSF Standard 53 or 58 rated) Cyst reduction / removal (filter)	—	+ to ++	+++++
<b>Protozoa-</b> <i>Giardia intestinalis</i> (aka <i>Giardia lamblia</i> )	Gastrointestinal illness (e.g., diarrhea, vomiting, cramps)	Human and animal fecal waste	+++++	+++ Absolute ≤ 1.0 micron filter (NSF Standard 53 or 58 rated) Cyst reduction / removal (filter)	+ to ++	+++	+++++
<b>Bacteria-</b> (e.g., <i>Campylobacter</i> , <i>Salmonella</i> , <i>Shigella</i> , <i>E. coli</i> )	Gastrointestinal illness (e.g., diarrhea, vomiting, cramps)	Human and animal fecal waste	+++++	++ Absolute ≤ 0.3 micron filter	+++	+++	+++++
<b>Viruses-</b> (e.g., enterovirus, hepatitis A, norovirus, rotavirus)	Gastrointestinal illness (e.g., diarrhea, vomiting, cramps)	Human and animal fecal waste	+++++	—	+++	+++	++++
<b>Treatment methods listed above:</b>							
* <b>Boiling</b> can be used as a pathogen reduction method that should kill all pathogens. Water should be brought to a rolling boil for 1 minute (at altitudes greater than 6,500 feet (2,000 m), boil water for 3 minutes).							
** <b>Filtration</b> can be used as a pathogen reduction method against most microorganisms, depending on the pore size of the filter, amount of the contaminant, particle size of the contaminant, and charge of the contaminant. Manufacturers' instructions must be followed. More information on selecting an appropriate water filter can be found at <a href="http://www.cdc.gov/safedrinkingwater.htm">www.cdc.gov/safedrinkingwater.htm</a> . Only filters that contain a chemical disinfectant matrix will be effective against some viruses.							
*** <b>Disinfection</b> can be used as a pathogen reduction method against microorganisms. However, contact time, disinfectant concentration, water temperature, water turbidity (cloudiness), water pH, and many other factors can impact the effectiveness of chemical disinfection. The length of time and concentration of disinfectant varies by manufacturer and effectiveness of pathogen reduction depends on these factors. 100% effectiveness may not be achieved. Manufacturer's instructions must be followed.							
**** If boiling water is not possible, a <b>Combination of Filtration and Chemical Disinfection</b> is the most effective pathogen reduction method in drinking water for backcountry or travel use. Manufacturer's instructions must be followed.							
<b>Other treatment methods can be effective against some of the above pathogens:</b>							
• <b>Ultraviolet Light (UV Light)</b> can be used as a pathogen reduction method against some microorganisms. The technology requires effective prefiltering due to its dependence on low water turbidity (cloudiness), the correct power delivery, and correct contact times to achieve maximum pathogen reduction. UV might be an effective method for pathogen reduction in untreated or poorly treated water; there is a lack of independent testing data available on specific systems. Manufacturer's instructions must be followed.							
• <b>MIXOX</b> systems use a salt solution to create mixed oxidants, primarily chlorine. As a result, refer to the category above for chlorine disinfection. Manufacturer's instructions must be followed.							
<b>Important:</b> Water that has been disinfected with iodine is <b>NOT</b> recommended for pregnant women, people with thyroid problems, those with known hypersensitivity to iodine, or continuous use for more than a few weeks at a time.							
<b>In addition to using the appropriate drinking water treatment methods listed above, you can also protect yourself and others from waterborne illness by:</b>							
• <b>Buying</b> human waste 8 inches deep and at least 200 feet away from natural waters.							
• <b>Practicing good personal hygiene.</b> Wash hands before handling food, eating, and after using the toilet.							

## Hypothermia/Frostbite

---

Cold injuries are usually due to prolonged exposure to cold temperatures, although they can occur with brief exposure to extremely cold conditions.

**\*For more information go to:**

- <http://www.hughston.com/hha/a.coldinj.htm>

## ATV Safety

---

ATVs are not toys. Serious injury can result from improper use of ATVs, but with preparation and practice, people can safely develop and expand their riding skills.

**\*For more information go to:**

- [http://www.classbrain.com/artteenah/publish/atv\\_safety\\_tips.shtml](http://www.classbrain.com/artteenah/publish/atv_safety_tips.shtml)

## Lightning

---

Lightning kills more people in this country than tornadoes, floods and hurricanes.

**\*For more information go to:**

- <http://www.nssl.noaa.gov/edu/safety/lightning.html>
- [http://cimms.ou.edu/%7Edoswell/tstm\\_camping\\_safety.html](http://cimms.ou.edu/%7Edoswell/tstm_camping_safety.html)

## Towing a Trailer

---

When a driver is trailer towing, they are even more likely to be involved in an accident.

**\*For more information go to:**

- [http://www.accessconnect.com/trailer\\_safety\\_tips.htm](http://www.accessconnect.com/trailer_safety_tips.htm)
- <http://www.trailertowingsafety.com/features.html>

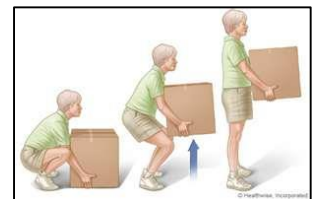
## Proper Lifting

---

It's important to know how to properly lift to avoid compressing the spinal discs or straining the lower back.

**\*For more information go to:**

- <http://orthopedics.about.com/cs/backpain/ht/lift.htm>



## Preventing Back Injuries in the Work Place:

---

**BACK INJURIES -- NATION'S #1 WORKPLACE SAFETY PROBLEM**

Preventing back injuries is a major workplace safety challenge. According to the Bureau of Labor Statistics, more than one million workers suffer back injuries each year, and back injuries account for one of every five workplace injuries or illnesses. Further, one-fourth of all compensation indemnity claims involve back injuries, costing industry billions of dollars on top of the pain and suffering borne by employees.

Moreover, though lifting, placing, carrying, holding and lowering are involved in manual materials handling (the principal cause of compensable work injuries) the BLS survey shows that four out of five of these injuries were to the lower back, and that three out of four occurred while the employee was lifting.

No approach has been found for totally eliminating back injuries caused by lifting, though it is felt that a substantial portion can be prevented by an effective control program and ergonomic design of work tasks.

Source: <http://www.ehs.okstate.edu/training/oshaback.htm>

Many back injuries can be traced to improper lifting and carrying. Your workers need to use good body mechanics every time they lift, carry, and unload objects.

When workers lift, they should:

- Face the load with feet shoulder-width apart.
- Keep heels down and turn feet slightly out.
- Squat by bending at the hips and knees.
- Use leg and stomach muscles to power the lift--not back muscles.
- Maintain the back's natural curves as they lift by keeping their head up.

When workers carry objects, they should:

- Point their feet in the direction they move and walk at a slow, steady pace.
- Take small steps and turn their body as a single unit to avoid twisting the upper body.
- Hug the load.

Source: [http://safetydailyadvisor.blr.com/archive/2009/04/15/injuries\\_illness\\_back\\_injuries\\_prevention\\_keys.aspx](http://safetydailyadvisor.blr.com/archive/2009/04/15/injuries_illness_back_injuries_prevention_keys.aspx)

More information about preventing back injuries in an office environment:

[http://www.safework.sa.gov.au/uploaded\\_files/resHealthyWorkplaceOffice.pdf](http://www.safework.sa.gov.au/uploaded_files/resHealthyWorkplaceOffice.pdf)

## Electrical Safety Tips:

---

**Electrical safety tips** are important for each employer to have and understand. When it comes to dealing with electrical and electrical equipment, safety always needs to be top notch in the office or workplace. Many things can go wrong when working with electrical systems. Each year many people are seriously hurt and often times death is an end result. Fire is always a huge concern when dealing with electrical. There are many simple steps that can be taken to always ensure the safety of everyone, but everyone involved must understand the importance of following the electrical safety rules.

With all safety procedures it is of the most importance to make sure that all your employees are always properly trained. Injury can occur very easily, but especially when you are dealing with electrical. Whatever types of electrical system your employees are working with make sure you supply them with the training needed to operate the machine correctly and how to fix something if a malfunction takes place. When you are training your employees on electrical safety, stress to them how important it is for them to really take their time. Accidents happen the most when people are rushing to get a task done.

## Workplace Safety Electrical Tips

---

The best words of advice that can be given with dealing with electric, is always make sure the power is turned off first before any work is started. Electrical related injuries cannot happen if there is no power supply. Here is a list of some great electrical safety tips that are sure to make your workplace safer. Some **office electrical safety tips** can be found below.

- Never allow your employees to overload circuits. To many cords plugged into a sock it is a very easy way to start a fire.
- When buying electrical equipment for your company, make sure that they are approved by a company such as Underwriters Laboratories (UL).
- Make sure all electrical cords around the office are in good working condition. If you come across cords that are frayed or broken, make sure you have them replaced immediately.
- It is a good idea to have a weekly check of all electrical appliances around the company to make sure everything is in good working condition.
- Never keep electrical appliances around water. If a drink is spilled near a computer system, have it cleaned up immediately.
- Be careful when using electrical extension cords. It is very important not to have too many things plugged in to the same cord.
- Only have three prong plugs plugged into three prong sockets. 3 Prong plugs can only be safely plugged in to 3 pronged electrical outlets, or electrical sockets.
- Make sure your staff is always wearing the right protective gear when dealing with electrical systems.
- Always take the time to check to see if light switches and other such electrical systems are hot or overheating, if they are having them replaced right away.
- Flickering lights can be a good indication that there could be electrical problems. If this occurs, make sure to have it check out as soon as possible.
- If electrical tools start to show wear and tear have them replace.

Source: <http://workplace-safetytips.com/electrical-safety-tips/>

## Work Place Stress

---

**What is work place stress?** Work place stress occurs when there is a poor match between job demands and the capabilities, resources, or needs of the worker.<sup>[1]</sup>

Stress-related disorders encompass a broad array of conditions, including psychological disorders (e.g., depression, anxiety, post-traumatic stress disorder) and other types of emotional strain (e.g., dissatisfaction, fatigue, tension, etc.), maladaptive behaviors (e.g., aggression, substance abuse), and cognitive impairment (e.g., concentration and memory problems). In turn, these conditions may lead to

poor work performance or even injury. Job stress is also associated with various biological reactions that may lead ultimately to compromised health, such as cardiovascular disease,<sup>[2]</sup> or in extreme cases death.

**Prevalence:** Stress is a prevalent and costly problem in today's workplace. About one-third of workers report high levels of stress.<sup>[1]</sup> One-quarter of employees view their jobs as the number one stressor in their lives.<sup>[3]</sup> Three-quarters of employees believe the worker has more on-the-job stress than a generation ago.<sup>[4]</sup> Evidence also suggests that stress is the major cause of turnover in organizations.

**Signs of Workplace Stress:** Stress-related problems include mood disturbance, psychological distress, sleep disturbance, upset stomach, headache, and problems in relationships with family and friends. The effects of job stress on chronic diseases are more difficult to ascertain because chronic diseases develop over relatively long periods of time and are influenced by many factors other than stress. Nonetheless, there is some evidence that stress plays a role in the development of several types of chronic health problems--including cardiovascular disease, musculoskeletal disorders, and psychological disorders

**Prevention:** A combination of organizational change and stress management is often the most useful approach for preventing stress at work.

### How to Change the Organization to Prevent Job Stress

- Ensure that the workload is in line with workers' capabilities and resources.
- Design jobs to provide meaning, stimulation, and opportunities for workers to use their skills.
- Clearly define workers' roles and responsibilities.
- Give workers opportunities to participate in decisions and actions affecting their jobs.
- Improve communications-reduce uncertainty about career development and future employment prospects.
- Provide opportunities for social interaction among workers.
- Establish work schedules that are compatible with demands and responsibilities outside the job.
- Combat workplace discrimination (based on race, gender, national origin, religion or language).
- Bringing in an objective outsider such as a consultant to suggest a fresh approach to persistent problems.<sup>[14]</sup>
- Introducing a participative leadership style to involve as many subordinates as possible to resolve stress-producing problems.<sup>[15]</sup>

Source: [http://en.wikipedia.org/wiki/Workplace\\_stress](http://en.wikipedia.org/wiki/Workplace_stress)

---

## What's in that Fridge?

### Refrigerator Cleanliness and Office refrigerators

---

Office refrigerators don't seem like they could be hiding a dirty secret behind the door, but a recent survey by the American Dietetic Association says these shared ice boxes can be breeding grounds for germs.

"A refrigerator is not going to be disinfecting its surfaces. The bacteria and food that get on surfaces would need to be disinfected, or they would just grow over time slowly," said Scott Pritchard, Food Safety Expert.

The survey discovered that 22% of office refrigerators are only cleaned once or twice a year.

Source: <http://www.whec.com/news/stories/s1729012.shtml?cat=566>

### Types of Bacteria in Refrigerated Foods

There are two completely different families of bacteria: *pathogenic* bacteria, the kind that cause foodborne illness, and *spoilage* bacteria, the kind of bacteria that cause foods to deteriorate and develop unpleasant odors, tastes, and textures.

*Pathogenic* bacteria can grow rapidly in the "Danger Zone," the temperature range between 40 and 140 °F, but they do not generally affect the taste, smell, or appearance of a food. In other words, one cannot tell that a pathogen is present.

*Spoilage* bacteria can grow at low temperatures, such as in the refrigerator. Eventually they cause food to develop off or bad tastes and smells. Most people would not choose to eat spoiled food, but if they did, they probably would not get sick. It comes down to an issue of quality versus safety:

- Food that has been left too long on the counter may be dangerous to eat, but could look fine.
- Food that has been stored too long in the refrigerator or freezer may be of lessened quality, but most likely would not make anyone sick. (However, some bacteria such as *Listeria monocytogenes* thrive at cold temperatures, and if present, will multiply in the refrigerator over time and could cause illness.)

Source: [http://www.fsis.usda.gov/factsheets/refrigeration %26 food safety/](http://www.fsis.usda.gov/factsheets/refrigeration%26foodsafety/)

## Driving in the Rain

**Rainy driving tips** - Smart Motorist offers the following suggestions for safer driving in wet weather. In stormy conditions, it is more difficult to see other vehicles, road signs and the road itself. It is critical to make sure you can see and be seen.

- First and foremost: slow down! It takes longer to stop or adjust in wet weather.
- Stay toward the middle lanes - water tends to pool in the outside lanes.
- Maintain proper following distance (3 Second Rule). This needs to be increased in wet weather.
- Drive in the tracks of a car ahead of you.
- Don't follow large trucks or busses too closely. The spray created by their large tires reduces your vision. Take care when passing them as well; if you must pass, do so quickly and safely.
- Be more alert when driving in wet or slippery conditions. Watch out for brake lights in front of you.
- Avoid using your brakes; if possible, take your foot off the accelerator to slow down.
- Turn your headlights on even in a light rain, or in gloomy, foggy or overcast conditions. Not only do they help you see the road, but they'll help other drivers see you. If your car has daytime running lights you still should put them on, so vehicles behind you can see you better.
- Before it starts to rain, replace old or brittle wipers.
- Avoid off-road driving: it's hard to judge the actual depth of puddles and you can easily become stuck, even in an SUV.
- Never drive beyond the limits of visibility. At night rainy roads become especially treacherous. The glare of oncoming lights, amplified by the rain on your windscreen, can cause temporary loss

of visibility while substantially increasing driver fatigue. In rainy conditions pedestrians, livestock, and wildlife are extremely hard to spot and even harder to avoid.

- Never drive through moving water if you can't see the ground through it; your car could be swept off the road.
- When driving through a puddle of uncertain depth, go slow. If it's deeper than the bottom of your doors, turn around and find another route. Deep water can cause serious damage to a modern car's electrical system.
- Avoid splashing pedestrians.
- If possible, stay off the road during heavy thunderstorms. Large flashes of lightning can temporarily blind and disorient drivers, and the accompanying high winds and heavy rain can create deadly driving conditions.
- Slow down! This should be obvious but it also very important. People are so used to driving certain speeds on certain roads that sometimes they forget the need to slow down when inclement weather presents itself

## Stopping the Spread of Germs at Work

---

**How Germs Spread:** Illnesses like the flu (influenza) and colds are caused by viruses that infect the nose, throat, and lungs. The flu and colds usually spread from person to person when an infected person coughs or sneezes.

### How to Help Stop the Spread of Germs:

- Cover your mouth and nose when you sneeze or cough
- Cough or sneeze into a tissue and then throw it away. Cover your cough or sneeze if you do not have a tissue. Then, clean your hands, and do so every time you cough or sneeze.
- Clean your hands often
- When available, wash your hands -- with soap and warm water -- then rub your hands vigorously together and scrub all surfaces. Wash for 15 to 20 seconds. It is the soap combined with the scrubbing action that helps dislodge and remove germs.
- When soap and water are not available, alcohol-based disposable hand wipes or gel sanitizers may be used. You can find them in most supermarkets and drugstores. If using a gel, rub the gel in your hands until they are dry. The gel doesn't need water to work; the alcohol in the gel kills germs that cause colds and the flu.
  - Source: FDA/CFSAN Food Safety A to Z Reference Guide, September 2001: [Handwashing](#).
  - Avoid touching your eyes, nose, or mouth
- Germs are often spread when a person touches something that is contaminated with germs and then touches their eyes, nose, or mouth. Germs can live for a long time (some can live for 2 hours or more) on surfaces like doorknobs, desks, and tables.
- Stay home when you are sick and check with a health care provider when needed
- When you are sick or have flu symptoms, stay home, get plenty of rest, and check with a health care provider as needed. Your employer may need a doctor's note for an excused absence. Remember: Keeping your distance from others may protect them from getting sick. Common symptoms of the flu include:
  - fever (usually high)
  - headache
  - extreme tiredness
  - cough

- sore throat
- runny or stuffy nose
- muscle aches, and
- nausea, vomiting, and diarrhea, (much more common among children than adults).

---

Source: <http://www.cdc.gov/germstopper/work.htm>

---

## Staying Hydrated:

---

### The Importance of Drinking Enough Water

#### Where do I get the water I need?

Most of your water needs are met through the water and beverages you drink. You can get some fluid through the foods you eat. For example, broth soups and other foods that are 85% to 95% water such as celery, tomatoes, oranges, and melons.

#### What does water do in my body?

Water helps your body with the following:

- Keeps its temperature normal.
- Lubricates and cushions your joints.
- Protects your spinal cord and other sensitive tissues.
- Gets rid of wastes through urination, perspiration, and bowel movements.



Why do I need to drink enough water each day? You need water to replace what your body loses through normal everyday functions. Of course, you lose water when you go to the bathroom or sweat, but you even lose small amounts of water when you exhale. You need to replace this lost water to prevent dehydration.

Your body also needs more water when you are:

- In hot climates.
- More physically active.
- Running a fever.
- Having diarrhea or vomiting.

To help you stay hydrated during prolonged physical activity or when it is hot outside, the *Dietary Guidelines for Americans 2005* recommend these two steps:

1. Drink fluid while doing the activity.
2. Drink several glasses of water or other fluid after the physical activity is completed.<sup>1</sup>

Also, when you are participating in vigorous physical activity, it's important to drink before you even feel thirsty. Thirst is a signal that your body is on the way to dehydration. For more information, visit [Fit Facts](#),





Healthy Hydration from the American Council on Fitness.\*(PDF-1.4Mb)

Some people may have fluid restrictions because of a health problem, such as kidney disease. If your healthcare provider has told you to restrict your fluid intake, be sure to follow that advice.

### **Tips for Increasing Your Fluid Intake by Drinking More Water**

Under normal conditions, most people can drink enough fluids to meet their water needs. If you are outside in hot weather for most of the day or doing vigorous activity, you may need to increase your fluid intake. If you think you're not getting enough water each day, the following tips may help:

- Carry a water bottle for easy access when you are at work or running errands.
- Freeze some freezer-safe water bottles. Take one with you for ice-cold water all day long.
- Choose water instead of sugar-sweetened beverages. This tip can also help with weight management. Substituting water for one 20-ounce sugar-sweetened soda will save you about 240 calories.
- Choose water instead of other beverages when eating out. Generally, you will save money and reduce calories.
- Give your water a little pizzazz by adding a wedge of lime or lemon. This may improve the taste, and you just might drink more water than you usually do.

### **Do sugar-sweetened beverages count?**

Although beverages that are sweetened with sugars do provide water, they usually have more calories than unsweetened beverages. To help with weight control, you should consume beverages and foods that don't have added sugars.

Examples of beverages with added sugars:

- Fruit drinks.
- Some sports drinks.
- Soft drinks and sodas (non-diet).

Visit [Rethink Your Drink](#) for more information about the calories in beverages and how you can make better drink choices to reduce your calorie intake.

Source: <http://www.cdc.gov/nutrition/everyone/basics/water.html>



## **Office Ergonomics**

Ergonomics (say "er-guh-NOM-iks") is the study of the kind of work you do, the environment you work in, and the tools you use to do your job. The goal of office ergonomics is to set up your office work space so that it fits you and the job you are doing.

When your workstation is set up right, you may:

- Be less likely to have problems such as headaches or eyestrain.
- Reduce neck and back pain.
- Prevent bursitis or tendon problems that are linked to doing the same task over and over (repetitive tasks).

### **Why should your work area be ergonomic?**

It's common for injury and illness to happen at work. Both can cost you and your employer time and money. They can also affect how well you do your job.<sup>1</sup> In one study, more than half of the workers who used computers for at least 15 hours a week had joint problems in the first year of a new job.

Most on-the-job injuries are caused by:

- Falls.
- Repetitive movements.
- The way you sit or stand (posture).
- Bending over, lifting heavy objects, or using pressure or force.
- Working with vibrating tools.

Office ergonomics can help you be more comfortable at work. It can help lower stress and injury caused by awkward positions and repetitive tasks. It focuses on how things are set up in your office work space, such as:

- Your workstation setup, how you sit, and how long you stay in one position.
- How you do a certain task, the kinds of movements you make, and whether you make the same movements over and over.
- Your work area, including light, noise, and temperature.
- The tools you use to do your job and whether they are set up to fit your needs.

Source: <http://www.webmd.com/pain-management/tc/office-ergonomics-topic-overview>

## **Insect Repellent: Safe Use**

---

For the safe and effective use of pesticide products, always read the product label before using the product. Apply just enough repellent to cover exposed skin and/or clothing.

### **Remember these important points to use repellents safely:**

- Follow the label directions to ensure proper use.
- Repellents should be applied only to exposed skin and/or clothing. Do not use under clothing.
- Store insect repellents safely out of the reach of children, in a locked utility cabinet or garden shed.
- Do not apply near eyes and mouth, and apply sparingly around ears.
- When using sprays, do not spray directly into face; spray on hands first and then apply to face.

- Never use repellents over cuts, wounds, or irritated skin.
- Do not spray in enclosed areas. Avoid breathing a spray product, and do not use it near food.
- After returning indoors, wash treated skin and clothes with soap and water.
- Do not use any product on pets or other animals unless the label clearly states it is for animals.
- Most insect repellents do not work on lice or fleas.
- Use other preventive actions to avoid getting bitten.

### **Why should I use insect repellent?**

Insect repellents can help reduce exposure to mosquito bites that may carry viruses such as West Nile virus that can cause serious illness and even death. Using insect repellent allows you to continue to play and work outdoors with a reduced risk of mosquito bites.

### **When should I use mosquito repellent?**

Apply repellent when you are going to be outdoors. Even if you don't notice mosquitoes there is a good chance that they are around. Many of the mosquitoes that carry West Nile virus bite between dusk and dawn. If you are outdoors around these times of the day, it is especially important to apply repellent. In many parts of the country, there are mosquitoes that also bite during the day, and some of these mosquitoes have also been found to carry West Nile virus.

### **How often should repellent be reapplied?**

In general you should re-apply repellent if you are being bitten by mosquitoes. Always follow the directions on the product you are using. Sweating, perspiration or getting wet may mean that you need to re-apply repellent more frequently. Repellents containing a higher concentration (higher percentage) of active ingredient typically provide longer-lasting protection.

### **How does mosquito repellent work?**

Female mosquitoes bite people and animals because they need the protein found in blood to help develop their eggs. Mosquitoes are attracted to people by skin odors and carbon dioxide from breath. The active ingredients in repellents make the person unattractive for feeding. Repellents do not kill mosquitoes. Repellents are effective only at short distances from the treated surface, so you may still see mosquitoes flying nearby.

---

Information compiled from: <http://epa.gov/pesticides/insect/safe.htm> and  
[http://www.cdc.gov/ncidod/dvbid/westnile/qa/insect\\_repellent.htm](http://www.cdc.gov/ncidod/dvbid/westnile/qa/insect_repellent.htm)

## **Personal Hygiene**

---

Personal hygiene is one of the most effective ways to protect ourselves and others from illness.

### **\*For more information go to:**

- <http://www.cdc.gov/niosh/topics/mrsa/>
- [http://www.webhealthcentre.com/general/ph\\_index.asp](http://www.webhealthcentre.com/general/ph_index.asp)

## Blue-Green Algae Blooms

---

Some blue-green algae blooms can be toxic or poisonous if the water is swallowed by wildlife, livestock, pets or people.

**\*For more information go to:**

- <http://www.seacoastonline.com/apps/pbcs.dll/article?AID=/20070809/OPINION0434/708090323/-1/SPORTS11>
- [http://www.ct.gov/deep/cwp/view.asp?a=2719&q=510024&deepNav\\_GID=1654](http://www.ct.gov/deep/cwp/view.asp?a=2719&q=510024&deepNav_GID=1654)

## Dehydration

---

Thirst is a sign of dehydration and means that the body doesn't have enough water in it to keep it working right. If working outside, it's a good idea to drink water before, during, and after, especially if it's hot, and consider electrolytes if sweating profusely.

**\*For more information go to:**

- <http://www.medicinenet.com/dehydration/article.htm>
- [http://kidshealth.org/teen/safety/first\\_aid/dehydration.html](http://kidshealth.org/teen/safety/first_aid/dehydration.html)
- <http://www.webmd.com/fitness-exercise/tc/dehydration-home-treatment>

## Heat Related Illness

---

### Prevention, Symptoms, and Treatment

According to the Centers for Disease Control and Prevention, approximately 400 Americans die each year due to summer's sweltering heat. Furthermore, the National Weather Service asserts that excessive heat was the number one weather-related killer, causing more fatalities per year than floods, lightning, tornadoes, hurricanes, winter storms and extreme cold from 1994 to 2003.

Everyone is at risk when temperatures rise above 90 degrees but the elderly and the very young are most susceptible to heat and heat-related illnesses. Heat-related illnesses can cause serious injury and even death if unattended. Signs of heat-related illnesses include nausea, dizziness, flushed or pale skin, heavy sweating and headaches. Victims of heat-related illness should be moved to a cool place, given cool water to drink and ice packs or cool wet cloths should be applied to the skin. If a victim refuses water, vomits or loses consciousness, call 9-1-1 or your local emergency number immediately.

### Red Cross Heat Safety Tips:

**Dress for the heat.** Wear lightweight, light-colored clothing. Light colors will reflect away some of the sun's energy. It is also a good idea to wear hats or to use an umbrella.

**Drink water.** Carry water or juice with you and drink continuously even if you do not feel thirsty. Avoid alcohol and caffeine, which dehydrate the body. Avoid using salt tablets unless directed to do so by a physician.

**Eat small meals and eat more often.** Avoid high-protein foods, which increase metabolic heat.

**Slow down. Avoid strenuous activity.** If you must do strenuous activity, do it during the coolest part of the day, which is usually in the morning between 4 and 7 a.m.

**Stay indoors when possible.** If air-conditioning is not available, stay on the lowest floor out of the sunshine. Remember that electric fans do not cool, they simply circulate the air.

**Be a good neighbor.** During heat waves, check in on elderly residents in your neighborhood and those who do not have air conditioning.

**Learn Red Cross first aid and CPR.**

**What are the warning signs of a heat stroke?** Extremely high body temperature (above 103°F); Red, hot, and dry skin (no sweating); Rapid, strong pulse; Throbbing headache; Dizziness; Nausea; Confusion; Unconsciousness.

**What are the warning signs of heat exhaustion?** Heavy sweating; Paleness; Muscle cramps; Tiredness; Weakness; Dizziness; Headache; Nausea or vomiting; Fainting



**Heat cramps or heat exhaustion:** Get the person to a cooler place and have him or her rest in a comfortable position. If the person is fully awake and alert, give half a glass of cool water every 15 minutes. Do not let him or her drink too quickly. Do not give liquids that contain alcohol or caffeine. Remove or loosen tight clothing and apply cool, wet cloths, such as towels or sheets. Call 9-1-1 or the local emergency number if the person refuses water, vomits or loses consciousness.

**Heat stroke:** Heat stroke is a life-threatening situation! Help is needed fast. Call 9-1-1 or your local emergency number. Move the person to a cooler place. Quickly cool the body. Immerse victim in a cool bath, or wrap wet sheets around the body and fan it. Watch for signals of breathing problems. Keep the person lying down and continue to cool the body any way you can. If the victim refuses water or is vomiting or there are changes in the level of consciousness, do not give anything to eat or drink.

---

Information compiled from: <http://www.redcross.org> and <http://www.bt.cdc.gov/disasters/extremeheat/faq.asp>

---

## Barbeque Safety

### General Grilling Safety:

**Grills are for outside, only:** Barbecue grills are designed for outdoor use, only. Never barbecue in your trailer, tent, house, garage, or any enclosed area because carbon monoxide may accumulate and kill you.

**Use in well-ventilated area:** Set up your grill in an open area that is away from buildings, overhead combustible surfaces, dry leaves, or brush. Be sure to avoid high traffic areas and always barbecue in a well-ventilated area. Be aware of wind-blown sparks.

**Keep grill stable:** When using a barbecue grill, be sure that all parts of the unit are firmly in place and that the grill is stable (can't be tipped over).

**Follow electric codes:** If electrically-operated accessories are used (rotisseries, etc.), be sure they are properly grounded in accordance with local codes. Electrical cords should be placed away from walkways or anywhere people can trip over them.

**Use long-handled utensils:** Use barbecue utensils with long handles (forks, tongs, etc.) to avoid burns and splatters.

**Wear safe clothing:** Wear clothing that does not have hanging shirt tails, frills, or apron strings that can catch fire, and use flame-retardant mitts when adjusting hot vents.

**Keep fire under control:** To put out flare-ups, either raise the grid that the food is on, spread the coals out evenly, or adjust the controls to lower the temperature. If you must douse the flames with a light spritz of water, first remove the food from the grill.

**Be ready to extinguish flames:** Use baking soda to control a grease fire and have a fire extinguisher handy. A bucket of sand or a garden hose should be near if you don't have a commercial extinguisher.

**Consider placing a grill pad or splatter mat beneath your grill:** These naturally heat resistant pads are usually made of lightweight composite cement or plastic and will protect your deck or patio from any grease that misses the drip pan.

**Never leave a grill unattended once lit.**

**Stay away from hot grill:** Don't allow anyone to conduct activity near the grill when in use or immediately following its use. The grill body remains hot up to an hour after being used.

**Don't move a hot grill:** Never attempt to move a hot grill. It's easy to stumble or drop it and serious burns could result.

**Keep in mind basic food handling procedure also!**

**Thaw Safely:** Completely thaw meat and poultry before grilling so it cooks more evenly. Use the refrigerator for slow, safe thawing or thaw sealed packages in cold water. For quicker thawing, you can microwave defrost if the food will be placed immediately on the grill.

**Transporting:** When carrying food to another location, keep it cold to minimize bacterial growth. Use an insulated cooler with sufficient ice or ice packs to keep the food at 40 °F or below. Pack food right from the refrigerator into the cooler immediately before leaving home.

**Keep Cold Food Cold:** Keep meat and poultry refrigerated until ready to use. Only take out the meat and poultry that will immediately be placed on the grill.

When using a cooler, keep it out of the direct sun by placing it in the shade or shelter. Avoid opening the lid too often, which lets cold air out and warm air in. Pack beverages in one cooler and perishables in a separate cooler.

**Cook Thoroughly:** Cook food to a safe minimum internal temperature to destroy harmful bacteria. Meat and poultry cooked on a grill often browns very fast on the outside. Use a food thermometer to be sure the food has reached a safe minimum internal temperature.

Information compiled from: [http://www.fsis.usda.gov/Factsheets/Barbecue\\_Food\\_Safety/index.asp](http://www.fsis.usda.gov/Factsheets/Barbecue_Food_Safety/index.asp) and <http://www.hpba.org/consumers/barbecue/general-grilling-safety>

---

# Asbestos

---

## What is asbestos?

Asbestos is the name given to a group of naturally occurring minerals that are resistant to heat and corrosion. Asbestos has been used in products, such as insulation for pipes (steam lines for example), floor tiles, building materials, and in vehicle brakes and clutches. Asbestos includes the mineral fibers chrysotile, amosite, crocidolite, tremolite, anthophyllite, actinolite and any of these materials that have been chemically treated or altered. Heavy exposures tend to occur in the construction industry and in ship repair, particularly during the removal of asbestos materials due to renovation, repairs, or demolition. Workers are also likely to be exposed during the manufacture of asbestos products (such as textiles, friction products, insulation, and other building materials) and during automotive brake and clutch repair work.

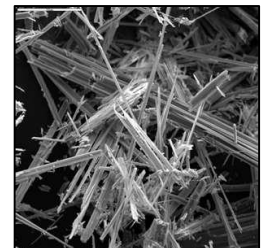
## What are the hazards of asbestos?

Asbestos is well recognized as a health hazard and its use is now highly regulated by both OSHA and EPA. Asbestos fibers associated with these health risks are too small to be seen with the naked eye, and smokers are at higher risk of developing some asbestos-related diseases. Breathing asbestos fibers can cause a buildup of scar-like tissue in the lungs called asbestosis and result in loss of lung function that often progresses to disability and death. Asbestos also causes cancer of the lung and other diseases such as mesothelioma of the pleura which is a fatal malignant tumor of the membrane lining the cavity of the lung or stomach.



## What can be done to reduce the hazards of asbestos?

Worker exposure to asbestos hazards are addressed in specific OSHA standards for the construction industry, general industry and shipyard employment sectors. These standards reduce the risk to workers by requiring that employers provide personal exposure monitoring to assess the risk and hazard awareness training for operations where there is any potential exposure to asbestos. Airborne levels of asbestos are never to exceed legal worker exposure limits. Where the exposure does, employers are required to further protect workers by establishing regulated areas, controlling certain work practices and instituting engineering controls to reduce the airborne levels. The employer is required to ensure exposure is reduced by using administrative controls and provide for the wearing of personal protective equipment. Medical monitoring of workers is also required when legal limits and exposure times are exceeded.



Source and for more information: <http://www.osha.gov/SLTC/asbestos/index.html>

# Smoke Inhalation

---

Smoke inhalation occurs when you breathe in the products of combustion during a fire. Combustion results from the rapid breakdown of a substance by heat (more commonly called burning). Smoke is a mixture of heated particles and gases. It is impossible to predict the exact composition of smoke produced by a fire. The products being burned, the temperature of the fire, and the amount of oxygen available to the fire all make a difference in the type of smoke produced.

## Smoke Inhalation Causes

Smoke inhalation damages the body by simple asphyxiation (lack of oxygen), chemical irritation, chemical asphyxiation, or a combination of these.

## Smoke Inhalation Symptoms

Numerous signs and symptoms of smoke inhalation may develop. Symptoms may include cough, shortness of breath, hoarseness, headache, and acute mental status changes.

Signs such as soot in the airway passages or changes in skin color may be useful in determining the degree of injury.

- **Cough:** When the mucous membranes of the respiratory tract get irritated, they secrete more mucus.  
Bronchospasm and increased mucus production lead to reflex coughing.  
The mucus may be either clear or black depending on the degree of burned particles deposited in the lungs and trachea.
- **Shortness of breath:** This may be caused by direct injury to the respiratory tract, leading to decreased oxygen delivery to the blood, the decreased ability of blood to carry oxygen because of chemicals in smoke, or the inability of the body's cells to use oxygen. The patient may have rapid breathing as they attempt to compensate for these injuries.
- **Hoarseness or noisy breathing:** This may be a sign that fluids are collecting in the upper airway and may cause a blockage. Irritant chemicals may cause vocal cord spasm, swelling, and constriction of the upper airways.
- **Eyes:** Eyes may be red and irritated by the smoke, and there may be burns on the corneas in the eyes.
- **Skin color:** Skin color may range from pale to bluish to cherry red.
- **Soot:** Soot in the nostrils or throat may give a clue as to the degree of smoke inhalation. The nostrils and nasal passages may be swollen.
- **Headache:** In all fires, people are exposed to various quantities of carbon monoxide. The patient may have no respiratory problems, but may still have inhaled carbon monoxide. Headache, nausea, and vomiting are symptoms of carbon monoxide poisoning.
- **Changes in mental status:** Chemical asphyxiants and low levels of oxygen can lead to mental status changes. Confusion, fainting, seizures, and coma are all potential complications following smoke inhalation.

## When to Seek Medical Care

If the smoke inhalation victim has no signs or symptoms, home observation may be appropriate. If in doubt, call the doctor or go to the local emergency department for advice.

**Seek medical attention if the patient experiences the following symptoms with smoke inhalation:**

- Hoarse voice
- Difficulty breathing
- Prolonged coughing spells
- Mental confusion



Someone with smoke inhalation can get worse quickly. If such a person were transported by private vehicle, significant injury or death could occur on the way that could have been avoided if that person were transported by emergency medical services.

Information compiled from: [http://www.emedicinehealth.com/smoke\\_inhalation/page4\\_em.htm](http://www.emedicinehealth.com/smoke_inhalation/page4_em.htm)

## Spiders

---

**Overview:** The most common indoor spider bite is that of the pale sac spider, which spins a silken sac web in the corners of ceilings and walls. The bad news is that they're aggressive, abundant, and like to hang out where people do: in the house and garden. The good news about sac spiders is that their venom is not very toxic to people.

The most dangerous spiders in the U.S. are black widows and brown violin or brown recluse spiders. A black widow has a distinctive hourglass-shaped mark on the belly. A brown recluse has a violin-shaped marking on the back. If you're bitten by either, it's a medical emergency but rarely fatal.

Both black widows and violin spiders prefer warm climates. The black widow lives primarily in the Southern and Western United States. The violin spider is most commonly found in the Midwestern and Southern states. Both spiders like dark, dry, undisturbed places with easy access to flies. Remember that most spiders, even black widows, usually bite out of self-defense -- if they've been squeezed or sat on by something much bigger, like you.

### Preventing Spider Bites

To protect against spider bites, wear gloves, long sleeves, and long pants when working in areas where they like to hide. Watch where you put your hands and shake off clothing before you put it on or go inside.

Indoors, sweep, mop, or vacuum webs and spiders regularly. In attics, basements, and garages, place boxes off the floor and away from walls and tape them closed. Seal off cracks and gaps where spiders may enter your home to discourage them and their prey. Clean up clutter and trim growth near the house.

Strickman advises against routinely spraying your house for spiders. Spiders are helpful, he points out -- eating flies and even fleas. It's usually just as effective to clean out the webs and kill the spiders you see.

### Treating Spider Bites

The first step to treating a spider bite is to identify the type of spider, if possible.

The black widow's bite feels like a pinprick. At first, it may create red marks and a little swelling. Within a few hours, you may feel intense abdominal pain, stiffness, fever, and nausea. Severe muscle cramps, nausea, vomiting, seizure, and a rise in blood pressure may follow soon after. Life-threatening reactions are usually seen only in the elderly and small children. Anti-venom medicine is available. If possible, bring the spider with you so the doctor can identify it.

The brown recluse spider bite stings and may cause redness. Over time, this turns into a blister and then an ulcer. Symptoms can range from mild fever and rash to nausea and listlessness.

**For a black widow or violin spider bite:**

Clean the area with soap and water.

Tie a bandage above the bite if it is on an arm or leg and elevate it to help slow venom spread. The bandage should be snug but not tight enough to cut off circulation. Put a damp, cool cloth on the site.

See a doctor immediately.



Information from: <http://www.webmd.com/a-to-z-guides/wound-care-10/bugbites?page=4>

## Treating Cuts or Lacerations at Home

**Overview:** Most bleeding from a cut or laceration can be stopped with direct pressure and time (rest and elevation are also helpful).

- Cleaning with a gentle soap and water will help reduce the chance of bacterial infection.
- Antibiotic ointment (such as bacitracin) and a sterile gauze bandage will help to protect the wound from further infection and water loss until a scab forms.

### Medical Treatment for Cuts and Lacerations

- Just as at home, the first step is to stop the bleeding from a cut or laceration.
- If direct pressure is not enough, a blood pressure cuff can help as a temporary measure for cuts on arms and legs.
- Tourniquets are generally not helpful for cuts to the face or body.
- Medication to numb the area may be given. Depending on the size and location of the cut, this may be done using various methods:

### Topical medicine

- Direct injection of anesthetic into the wound
- Injection into a regional nerve -- called "nerve block" -- (for cuts to the finger-tip, the nerves at the finger base are often blocked with a series of shots)

### Cleaning is often the most important aspect of good wound care.

- This may be done by first washing the adjacent skin with soap and water and removing crusted blood with diluted hydrogen peroxide.
- Next, irrigation by squirting saline at the wound under high pressure is very effective at reducing bacterial contamination in the wound.
- Your doctor will decide the best way to repair your wound.

Some minor cuts can be closed with special adhesive tapes (Steri-Strips) or tissue glue (Dermabond or Indermil). Tissue glue can be used as a barrier against common bacterial microbes. Be sure to inform the doctor if you have any allergies to these adhesive tapes.

Deeper cuts may need stitches to repair deep structures (such as fascia, the connective tissue envelope around a muscle).

Stitches to the skin surface can help to stop bleeding, protect underlying tissues, and lessen scarring. Different bandages are chosen for their different material properties.

Some materials are better because they won't stick to your cut (Telfa or Vaseline gauze).

Others are more absorbent, provide needed surface pressure, or help to keep an injury immobile. Pressure bandages or splints may be applied, depending on the underlying injuries.

Information from: <http://firstaid.webmd.com/cuts-or-lacerations-treatment>

## Stop Ticks

*Gardening, camping, hiking, just playing outdoors* – These are all great spring and summertime activities, but don't forget about the ticks that may be in the same environment. Fortunately, there are several tactics you can use to prevent tick bites and reduce your risk of tick-borne disease.

Some of the more common diseases that you can get from a tick bite include (listed alphabetically):

- [Babesiosis](#)
- [Ehrlichiosis](#)
- [Lyme disease](#)
- [Rocky Mountain spotted fever](#)
- [Southern tick-associated rash illness](#)
- [Tick-borne relapsing fever](#)
- [Tularemia](#)



- Other diseases that you can get from a tick in the United States include [anaplasmosis](#), Colorado tick fever, and Powassan encephalitis.

In some species and life stages, ticks are so small that they can be difficult to see, but all hungrily look for animals and people to bite. Depending on the species, you can find ticks in various environments, often in or near wooded areas. You may come into contact with ticks when walking through infested areas or by brushing up against infested vegetation (such as leaf litter or shrubs). Ticks also feed on mammals and birds, which play a role in maintaining ticks and the pathogens they carry.

### Protect Yourself from Tick Bites

- **Know where to expect ticks.** Ticks live in moist and humid environments, particularly in or near wooded or grassy areas. You may come into contact with ticks during outdoor activities around your home or when walking through vegetation such as leaf litter or shrubs. Always walk in the center of trails, in order to avoid ticks.
- **Use a repellent with DEET** (on skin or clothing) **or permethrin** (on clothing) and wear long sleeves, long pants and socks. Products containing permethrin can be used to treat boots, clothing and camping gear which can remain protective through several washings. Repellents containing 20% or more DEET (N, N-diethyl-m-toluamide) can be applied to the skin, and they can protect up to several hours. **Always follow product instructions!** Parents should apply this product to their children, avoiding the hands, eyes, and mouth.
- **Check your body for ticks** after being outdoors, even in your own yard. Conduct a body check upon return from potentially tick-infested areas by searching your entire body for ticks. Use a hand-held or full-length mirror to view all parts of your body and [remove any tick you find](#). Check these parts of your body and your child's body for ticks:
  - Under the arms, in and around the ears, inside belly button, back of the knees, under the arms, in and around the hair, between the legs, around the waist

- **Shower soon after being outdoors.** Showering within two hours of coming indoors has shown to reduce your risk of being bitten by a tick.
- **Check your children for ticks,** especially in the hair, when returning from potentially tick-infested areas. See the list above for the places on your child's body to check for ticks. Remove any tick you find on your child's body.
- **Check your clothing for ticks.** Ticks may be carried into the house on clothing. Any ticks that are found should be removed. Placing clothes into a dryer on high heat for at least an hour effectively kills ticks.

### What to Do If You Are Bitten by a Tick

Remove an attached tick as soon as you notice it. Watch for signs of illness such as rash or fever, and see a health care provider if these develop.

Your risk of acquiring a tick-borne illness depends on many factors, including where you live, what type of tick bit you, and how long the tick was attached. If you become ill after a tick bite, see a health care provider.

---

Information from: <http://www.cdc.gov/Features/StopTicks/>

## Stay Safe While Boating

---

Everyone, on all types of boats, should wear properly-fitted life jackets, or personal flotation devices (PFD). By wearing a life jacket, you can dramatically decrease your chances of drowning while boating.

### Know the Facts

Recreational boating—enjoyed by over 70 million Americans each year—can be a wonderful way to spend time with family and friends. And making safety a priority can ensure that boating stays fun.

- **Consider that:**
- In 2009, 3,358 people were injured and 736 died in boating incidents. Of those who drowned, 9 out of 10 were *not* wearing life jackets.
- Of the people who died in a boating incident in 2009, more than 7 out of 10 (73%) drowned. More than 90 percent of the people who drowned were not wearing a life jacket.
- Alcohol use was the leading contributing factor in fatal boating incidents.

### Reduce Your Risk

Whenever you are headed out on the water, keep these tips from the U.S. Coast Guard in mind:

- **Wear it.** Properly fitted life jackets can prevent drownings and should be worn at all times by everyone on any boat. Comfortable Coast Guard-approved life jackets are now widely available.
- **Don't Drink.** Alcohol use affects judgment, vision, balance, and coordination, and is involved in about a third of all recreational boating fatalities. Boating under the influence of alcohol is just as deadly as drinking and driving. Not only is it dangerous to operate a boat while under the influence of drugs or alcohol, it's also illegal in every state in the United States.

It's not just boat operators at risk from drinking while boating. Passengers are at greater risk of injury as well. In fact, 46% of all boating fatalities occurred when vessels were docked, anchored, or drifting. Due to sun exposure and heat, both operators and passengers are likely to become impaired more quickly, drink for drink, when on the water. So play it safe and avoid alcohol when you're on a boat.

- **Take a Course.** More than 7 out of every 10 boating incidents are caused by operator error. Boating education courses teach the rules for safe operation and navigation of recreational boats, and can help boat operators keep their passengers safe.
- **Get a Vessel Safety Check.** The Vessel Safety Check (VSC) is a free public service provided by the U.S. Coast Guard Auxiliary and U.S. Power Squadron volunteer organizations. For more information on the VSC Program, visit their web site: [www.vesselsafetycheck.org](http://www.vesselsafetycheck.org).
- **Know about carbon monoxide (CO).** Carbon monoxide (CO) is an odorless, colorless, poisonous gas that is emitted by all internal combustion engines, such as boat engines and onboard motor generators. In the early stages, the symptoms of CO poisoning are similar to seasickness, but CO can kill in a matter of minutes, whether you are inside or outside of your boat. To avoid CO poisoning, be aware of the risk, ensure sufficient ventilation, properly install and maintain equipment, and use CO detectors, especially in living and sleeping areas.

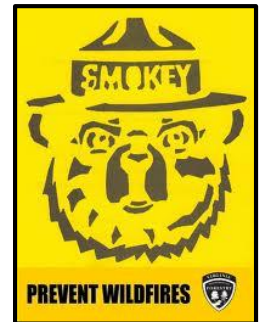
Information from: <http://www.cdc.gov/Features/BoatingSafety/>

## Campfire Safety

### How to Pick Your Spot

Follow these steps when picking your burning site to promote wildfire safety:

- DO NOT build a fire at a site in hazardous, dry conditions. DO NOT build a fire if the campground, area, or event rules prohibit campfires.
- FIND OUT if the campground has an existing fire ring or fire pit. If there is not an existing fire pit, and pits are allowed, look for a site that is at least fifteen feet away from tent walls, shrubs, trees or other flammable objects. Also beware of low-hanging branches overhead.
- Note: in some areas digging pits are not allowed because of archaeological or other concerns. Find out the rules in your area please.



### Building Your Campfire Pit from Scratch

Some campsites have unsuitable pits or may not offer pre-made pits at all. If this is the case:

- Choose a spot that's downwind protected from wind gusts, and at least 15 feet from your tent and gear.
- Clear a 10-foot diameter area around the site. Remove any grass, twigs, leaves and firewood. Also make sure there aren't any tree limbs or flammable objects hanging overhead.
- Dig a pit in the dirt, about a foot deep.
- Circle the pit with rocks.

Your campfire pit is built and ready for preparation!

### Preparing Your Campfire Pit:

Before you start your campfire, you need to prepare your pit.

- Fill the pit with small pieces of dry wood; never rip or cut branches from living trees.
- Place your unused firewood upwind and away from the fire.
- Keep a bucket of water and a shovel nearby.

### How to Build a Campfire!

Now that you have prepared your pit, it's time to build your campfire. Follow these steps to have a safe and fun time.

#### Gather three types of wood

- **Tinder** (small twigs, dry leaves or grass, dry needles)
- **Kindling** (sticks smaller than 1" around)
- **Fuel** (larger pieces of wood)

Loosely pile a few handfuls of tinder in the center of the fire ring/pit

Add kindling in one of these methods:

- **Tipi** (Good for cooking)  
Lay the kindling over the tinder like you're building a tent.
- **Cross** (Perfect for a long-lasting campfire)  
Crisscross the kindling over the tinder.
- **Lean-to** (Good for cooking)  
Drive a long piece of kindling into the ground at an angle over the tinder. Lean smaller pieces of kindling against the longer piece.
- **Log Cabin** (Longest lasting campfire)  
Surround your pile of tinder with kindling, stacking pieces at right angles. Top the "cabin" with the smallest kindling.

### Maintaining Your Campfire

As you're enjoying your campfire, remember these safety tips:

- Once you have a strong fire going, add larger pieces of dry wood to keep it burning steadily
- Keep your fire to a manageable size
- Make sure children and pets are supervised when near the fire
- Never leave your campfire unattended
- Never cut live trees or branches from live trees

### Extinguishing Your Campfire

When you're ready to put out your fire and call it a night, follow these guidelines:

1. Allow the wood to burn completely to ash, if possible
2. Pour lots of water on the fire, drown ALL embers, not just the red ones
3. Pour until hissing sound stops
4. Stir the campfire ashes and embers with a shovel
5. Scrape the sticks and logs to remove any embers
6. Stir and make sure everything is wet and they are cold to the touch

If you do not have water, use dirt. Mix enough dirt or sand with the embers. Continue adding and stirring until all material is cool. Remember: do NOT bury the fire as the fire will continue to smolder and could catch roots on fire that will eventually get to the surface and start a wildfire.

**REMEMBER: If it's too hot to touch, it's too hot to leave!**

- Don't burn dangerous things!
- Never burn aerosol cans or pressurized containers. They may explode.
- Never put glass in the fire pit. Glass does not melt away, it only heats up and shatters. Broken slivers of glass are dangerous.
- Aluminum cans do not burn. In fact, the aluminum only breaks down into smaller pieces. Inhaling aluminum dust can be harmful to your lungs.
- Pack it in, Pack it out.
- Be sure to pack out your trash. It is your responsibility to pack out everything that you packed in.

## Hand and Power Tool Safety

---

### HAND TOOLS

Hand tools are non-powered. They include anything from axes to wrenches. The greatest hazards posed by hand tools result from misuse and improper maintenance.

Some examples:

- Using a screwdriver as a chisel may cause the tip of the screwdriver to break and fly, hitting the user or other employees.
- If a wooden handle on a tool such as a hammer or an axe is loose, splintered, or cracked, the head of the tool may fly off and strike the user or another worker.
- A wrench must not be used if its jaws are sprung, because it might slip.

Impact tools such as chisels, wedges, or drift pins are unsafe if they have mushroomed heads. The heads might shatter on impact, sending sharp fragments flying. The employer is responsible for the safe condition of tools and equipment used by employees but the employees have the responsibility for properly using and maintaining tools.

Employers should caution employees that saw blades, knives, or other tools be directed away from aisle areas and other employees working in close proximity. Knives and scissors must be sharp. Dull tools can be more hazardous than sharp ones.

Appropriate personal protective equipment, e.g., safety goggles, gloves, etc., should be worn due to hazards that may be encountered while using portable power tools and hand tools.

Safety requires that floors be kept as clean and dry as possible to prevent accidental slips with or around dangerous hand tools. Around flammable substances, sparks produced by iron and steel hand tools can be a dangerous ignition source. Where this hazard exists, spark-resistant tools made from brass, plastic, aluminum, or wood will provide for safety.

### POWER TOOL PRECAUTIONS

Power tools can be hazardous when improperly used. There are several types of power tools, based on the power source they use: electric, pneumatic, liquid fuel, hydraulic, and powder-actuated.

Employees should be trained in the use of all tools - not just power tools. They should understand the potential hazards as well as the safety precautions to prevent those hazards from occurring.

The following general precautions should be observed by power tool users:

- Never carry a tool by the cord or hose.
- Never yank the cord or the hose to disconnect it from the receptacle.
- Keep cords and hoses away from heat, oil, and sharp edges.
- Disconnect tools when not in use, before servicing, and when changing accessories such as blades, bits and cutters.
- All observers should be kept at a safe distance away from the work area.
- Secure work with clamps or a vise, freeing both hands to operate the tool.
- Avoid accidental starting. The worker should not hold a finger on the switch button while carrying a plugged-in tool.
- Tools should be maintained with care. They should be kept sharp and clean for the best performance. Follow instructions in the user's manual for lubricating and changing accessories.
- Be sure to keep good footing and maintain good balance.

The proper apparel should be worn. Loose clothing, ties, or jewelry can become caught in moving parts.

## Road Rage

---

Road rage is a term that describes the aggressive driving of provoked, angry drivers who have committed acts of violence, including assaults and murder. It is important to recognize the warning signs of aggressive driving in order to avoid becoming involved in a potentially hazardous situation.

**\*For more information go to:**

- <http://www.safebee.com/travel/what-do-if-youre-victim-road-rage>

## Fire Extinguisher Safety

---

To safely and properly use a fire extinguisher, be familiar with what type of fire each extinguisher is rated for and know how it operates.

**\*For more information go to:**

- <http://www.fire-extinguisher101.com/using.html>
- <http://www.firstfireextinguishers.com/>

## Earthquake Safety

---

Earthquakes aren't planned, but YOU can plan, survive and help others. According to the US Geological Survey, there is a 60% chance that a 6.7 magnitude or greater earthquake will occur in California in the next 30 years. An earthquake of this size can pose an immediate hazard to worker safety, strain public services and disrupt business. The best way to survive an earthquake, or any other emergency, safely is to prepare, plan, and practice.



### **Prepare your workplace and home**

- Secure furniture such as bookshelves and file cabinets to walls
- Store the heaviest items at lower heights or secure them if stored higher
- Hang photos and pictures using “j” clips so they fall off the wall easier
- Keep emergency exits and areas below desks and tables clear of junk piles and miscellaneous items
- Stockpile enough emergency supplies for the number of workers that may need to shelter or work at your facility after an earthquake
- Set up emergency plans for families in case employees get stranded at work and plan a meeting place

### **Emergency supplies for office, home and car**

- Fire extinguishers flashlights, a radio, extra batteries, first aid kit, candles and matches or a lighter
- Food and potable water to sustain a number of people for at least three days
- Blankets and sanitary supplies like toilet paper and portable toilets
- Comfortable and layer-able clothes, extra shoes, personal hygiene items, and any necessary medications
- An emergency plan including evacuation routes, where to meet and account for everyone and how to get further instructions on what actions to take
- Current emergency contact phone numbers of coworkers, family and friends

### **Prepare yourself**

- Practice your emergency plan and evacuations with coworkers and family
- Check fire extinguishers, fire alarms, sprinklers and emergency lighting monthly so they are always ready to use
- Get CPR and first aid training

### **During an earthquake**

The best form of protection during an earthquake is to duck or drop down on the floor. Take cover under the closest sturdy desk or table and hold on to it so that you can move with it during the shaking. If you cannot take cover, stand against an interior wall and protect your head and neck with your arms. Be sure to communicate with and help others nearby.

## **Carpal Tunnel**

Yoga helps many people relieve tension, stress, and fatigue often caused by the rigors of the workplace. New research suggests that yoga can be used to treat another work-related health problem: carpal tunnel syndrome. Common in jobs where employees must continually repeat movements with their fingers, hands, and wrists, carpal tunnel syndrome is thought to result from nerve compression in the wrists, often causing such discomfort that workers can't perform their jobs.

The following stretches will ease the compression of the affected nerves, improves blood flow, and creates better joint posture.

Yoga's success in combating carpal tunnel symptoms should be good news for sufferers and employers alike. Career-related health conditions like carpal tunnel syndrome cost workers more in lost earnings than any other illnesses; such conditions cost businesses, too, through higher medical expenses and decreased productivity. One study suggests that yoga may be cheaper and more effective than the injection therapy, surgery, drugs, and wrist splints currently used to treat the syndrome. Researchers also believe yoga may discourage recurrence and help prevent the original onset of carpal tunnel symptoms.

## **Six Stretches to do at your desk:**

### **Side Stretch**

This is a great stretch to relieve computer-related tension in your wrists and to stretch your sides. It will also help relieve lower back tightness.

Stand with your feet hip-width apart and parallel. Inhale and stretch your arms out to the sides and then over your head with your palms facing each other. Exhale as you take hold of your left wrist with your right hand. With an inhalation, stretch the fingers of your left hand to the ceiling. Exhale as you gently stretch to the right, drawing out your left arm and wrist with the right hand, and move your hips to the left simultaneously. Keep your head and left arm in alignment with the torso. Don't drop your left arm in front of your face. Feel this stretch on the entire left side of your body, from your hips to your fingertips. Keep your feet solidly planted on the floor by pressing firmly down with your outer left heel. Continue to breathe softly as you stretch to the right, particularly noticing the deep stretch in the left rib cage as the breath enters your left lung. Inhale as you come back to center. Exhale and switch hands. Holding your right wrist with your left arm, inhale as you reach up through the fingers of your right hand. Exhale as you stretch to the left. Continue to breathe as you stretch to the left side. Inhale and return to the center. Repeat this sequence on each side.

### **Shoulder Rolls**

Movement is one of the best things you can do for your back if you've been sitting in the same position for a while. This particular movement helps relieve tension in the upper back and shoulders where the trapezius muscle is located. Sitting upright, inhale as you lift your right shoulder to your ear. Exhale as you slowly roll your shoulder around and back, dropping it away from your ear. Continue these shoulder rolls three more times, alternating right and left. Now, inhale as you lift both shoulders up to the ears. Exhale as you release them. Repeat five times and then relax your shoulders.

### **Neck Stretch**

This stretch is particularly good for a stiff or compressed neck. You can really feel how it lengthens and stretches the neck, creating space between each of the vertebrae in the cervical spine.

Sit upright without letting your back touch the back of the chair. Align your head directly over your spine and feel the crown of your head lifting. You may want to hold on to the side of your chair seat with your left hand. Breathe in, and on the exhalation, drop your right ear toward your right shoulder without lifting your right shoulder or turning your head. Take several breaths in and out, feeling the stretch on the left side of your neck.

To create a deeper stretch, reach over your head and place your right hand on the left side of your head to gently pull your neck away from your shoulders. At the same time, you can hold firmly onto the chair with your left hand to draw your left shoulder away from your neck.

Visualize your neck lengthening and the muscles along your vertebrae relaxing. Hold the pose for at least five more breaths, then release your left hand from the chair and gently massage your neck and shoulders with your left hand. Slowly lift the head and switch sides to repeat the sequence.

### **Open Chest Stretch**

This pose opens the chest, decreasing rounded shoulders and releasing tightness in the middle back. In addition, it helps decrease kyphosis, extreme forward curvature of the thoracic spine.

Sit near the edge of a chair and interlace your fingers behind you, with your palms facing your back. Leaning slightly forward, lift your arms and rest them on the back of the chair. Inhale and lift your chest. Exhale and relax your shoulders away from your ears. If your hands do not reach the top of the chair, clasp the sides of the chair back and pull your chest forward, relaxing your shoulders and opening your upper chest. Hold for 10 to 15 breaths, feeling lightness in your heart. With an exhalation, slowly release your hands and bring them down by your sides.

### **Chair Twist**

Twists are the antidote to sitting for long periods of time. After twisting, you will feel the release of all the muscles in your back (particularly in the middle back) that have been locked into position from sitting a long time.

Sit toward the front of a chair, then swivel your thighs toward the right side of the chair so you are sitting diagonally on the seat. If you have an arm rest on the side of the chair, bring your thighs as close to it as possible. Inhale and lift your right arm up to the ceiling. With an exhalation, move your arm to the back of the chair on the opposite side, taking hold of the chair back. Bring the left hand to the right knee or chair handle. Inhale and lengthen your spine. Exhale and twist to the right, pressing your right hand against the back of the chair to deepen the twist. Visualize the shoulder blades dropping down as if they were hanging from weights. Breathe into your rib cage. Consciously relax the muscles in your back and gently twist a little farther. Stay in the pose for 10 to 15 breaths. Return to your center with an exhalation and repeat on the opposite side.

### **Back and Shoulder Release**

Part One: Sit on the edge of a chair and place your feet about two and a half feet apart, parallel to each other. Lean forward and place your forearms on your inner thighs. Press your inner thighs out with your forearms. Breathe deeply in and out, feeling the stretch in your inner thighs.

Part Two: Make sure your knees are directly over your heels and your feet are parallel to each other. Slowly stretch your arms down towards the floor, resting your ribs on your thighs and your armpits towards your knees. Cross your arms, placing your hands at the opposite elbows. Continue to breathe deeply. Part Three: For a deeper stretch of the back, stretch your arms forward toward your desk or the floor, reaching through the fingertips and feeling your spine lengthening. Round your back and slowly roll up, returning to a sitting position.

Because bones, ligaments and tendons cannot be compressed, the soft median nerve is the only component in the carpal tunnel that can be pinched. When the lubricating linings around the tendons thicken because of repetitive or too forceful hand movements, the resulting pressure on the nerve causes pain, weakness, numbness, tingling or a burning sensation: carpal tunnel syndrome.

## **Overcoming Procrastination**

---

### **What is Procrastination?**

Procrastination is the avoidance of doing a task which needs to be accomplished. This can lead to feelings of guilt, inadequacy, depression and self-doubt among people. Procrastination has a high potential for painful consequences. It can interfere with the academic and personal success of students and professionals.

### **Why do People Procrastinate?**

- **Poor Time Management.** Procrastination means not managing time wisely. You may be uncertain of your priorities, goals and objectives. You may also be overwhelmed with the task. As a result, you keep putting off your assignments for a later date, or spending a great deal of time on various other tasks that seem less daunting or difficult.
- **Difficulty Concentrating.** When you sit at your desk you find yourself daydreaming, staring into space, looking at pictures of your boyfriend/girlfriend, etc., instead of doing the task at hand. Your environment is distracting and noisy. You keep running back and forth for equipment such as pencils, erasers, dictionary, etc. Your desk is cluttered and unorganized and you take time to thoroughly organize it before getting started. You probably notice that all of the examples that you have just read promote time wasting and frustration.
- **Fear and Anxiety.** You may be overwhelmed with the task and afraid of getting a failing grade. As a result, you spend a great deal of time worrying about your upcoming papers and projects, rather than completing them.
- **Negative Beliefs** such as; "I cannot succeed in anything" and "I lack the necessary skills to perform the task" may allow you to stop yourself from getting work done.
- **Personal problems.** For example, financial difficulties, problems with your boyfriend/girlfriend, etc.
- **Finding the Task Boring.**
- **Unrealistic Expectations and Perfectionism.** You may believe that you **MUST** read everything ever written on a subject before you can begin to write your paper. You may think that you haven't done the best you possibly could do, so it's not good enough to hand in.

### **How to Overcome Procrastination**

- Recognize self-defeating problems such as; fear and anxiety, difficulty concentrating, poor time management, indecisiveness and perfectionism.
- Identify your own goals, strengths and weaknesses, values and priorities.
- Compare your actions with the values you feel you have. Are your values consistent with your actions?
- Discipline yourself to use time wisely: Set priorities.
- Work in small blocks instead of long time periods. For example, you will accomplish more if you work in 60 minute blocks and take frequent 10 minute breaks in between, than if you work for 2-3 hours straight, with no breaks. Reward yourself after you complete a task.
- Motivate yourself to work: Dwell on success, not on failure. Break large assignments into small tasks. Keep a reminder schedule and checklist.
- Set realistic goals.

- Modify your environment: Eliminate or minimize noise/ distraction if possible. Ensure adequate lighting. Have necessary equipment at hand. Don't waste time going back and forth to get things. Be neat! Take a few minutes to straighten your desk.

## Hearing Loss- Hear Today Gone Tomorrow

---

Most workers take good hearing for granted. Hearing loss can happen so gradually that it can go unnoticed until it's too late. Then, even a hearing aid may not help. Some assume hearing loss is the unavoidable result of getting older, yet most hearing loss is due to noise over a lifetime. While loss of hearing may result from a single exposure to a noise or explosion, such traumatic losses are rare. Most cases of hearing loss begin gradually in frequencies slightly above that of human speech and then subtly spread to lower and higher frequencies.

Hearing loss can disrupt job performance, cause stress-related problems, increased heart rate, fatigue, irritability, tension and lead to unnecessary accidents or injuries on the job.

The workplace can be very noisy. Both the amount of noise and the duration of exposure determine the ability to damage hearing. Workers may be exposed to noise from many sources: equipment, vehicles, or tools, to name a few. Any of these things can damage hearing when exposure accumulates over extended periods of time.

### How can you tell if it is too loud?

- You have to raise your voice to be heard.
- You can't hear someone less than two feet away without shouting.
- Speech around you sounds muffled or dull after you leave a noisy area.
- You have ringing in your ears after exposure to noise.

### Preventative Measure:

What can employers do to prevent their workers from developing hearing problems?

Good planning can prevent problems caused by excessive noise exposure. Noise reduced at its source should be the first consideration. Employers should invest in noise-controlled equipment. When purchasing, employers can ask vendors if there is a "quiet" model or a noise-reducing option, such as enclosed or acoustically lined vehicular cabs and equipment. Work schedules can be adjusted so that exposure to high noise levels does not occur for the entire work day. This allows a noise recovery period to be part of the work shift. Equally important is the use of personal protection devices, such as ear plugs and ear muffs. Employers should provide training on the protection devices available and the effects of noise on hearing if workers do not use the protection. Training should include the fit, use, and care of any hearing protection device.

Employers can't always prevent noise, but they can lessen the chance of workers experiencing hearing loss by having them follow established safety procedures and enforcing the use of proper hearing protection. Don't risk losing a worker's hearing on the job. Silence may be a great thing, but not when it's permanent.